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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/086,355	03/01/2002	Victor Argueta-Diaz	OSU1159-183A	4162

8698 7590 08/13/2003

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EXAMINER

TRA, TUYEN Q

ART UNIT PAPER NUMBER

2873

DATE MAILED: 08/13/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/086,355

Applicant(s)

ARGUETA-DIAZ ET AL.

Examiner

Tuyen Q Tra

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 02 May 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-21 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 1-20 is/are allowed.
- 6) ☒ Claim(s) 21 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 3.
- 4) ☐ Interview Summary (PTO-413) Paper No(s) _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 112

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claim 21 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The apparatus claim 21 states “ a spot displacement device comprising at least one column and at least one row” (lines 1 and 3).

The apparatus claim 21 fails to show means (additional structures) for operating to shift a light beam by at least one row on the spot displacement device. How can only an array with only columns and rows achieve such functional results?

The apparatus claim 21 further discloses a functional limitation “said spot displacement device being operable for shifting a light beam by at least one row on said spot displacement device, each additional column of said spot displacement device operable for displacement of the previous column”. It should be noted that a function limitation is not given patentable weight in claim drawn to structure.

The functional recitation that “said spot displacement device being operable for shifting a light beam by at least one row on said spot displacement device, each additional column of said spot displacement device operable for displacement of the previous column” has not been given patentable weight because it is narrative in form. In order to be given patentable weight, a functional recitation must be expressed as a “means” for performing the specified function, as set

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forth in 35 USC §112, 6th paragraph, and must be supported by recitation in the claim of sufficient structure to warrant the presence of the function language. In re Fuller, 1929 C.D. 172; 388 O.G. 279.

Allowable Subject Matter

3. Claims 1-20

The reason for the indication of allowable subject matter is that (claim 1) at least one input light source, the input light source adapted to introduce at least one individual light beam, each the individual light beam emerging from a respective input light source; a first optical configuration, the first optical configuration comprising a first plurality of optical elements so as to define a plurality of possible light paths for each the individual light beam, the first optical configuration adapted to receive each the individual light beam emerging from each the input light source, the first optical configuration further adapted to direct a given light beam to a spatial light modulator; a second optical configuration, the second optical configuration comprising a second plurality of optical elements configured so as to define a plurality of possible light paths for each the individual light beam, the second optical configuration further comprising at least one spot displacement device, the second optical configuration adapted to receive as input an individual light beam reflected from the spatial light modulator, the second optical configuration further adapted to direct a light beam to the spatial light modulator; and at the spatial light modulator, the spatial light modulator comprising at least one column, each the column comprising at least two rows, the spatial light modulator adapted to select a given path from the plurality of possible light paths for a light beam, wherein the spot displacement device is operable for shifting a light beam on the spatial light modulator by at least one

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rowed; (claim 11) at least one input: light source, the input light source adapted to introduce at least one individual light beam, each the individual light beam emerging from a respective input light source; a first optical configuration, the first optical configuration comprising a first plurality of optical elements so as to define a plurality of possible light paths for each the individual light beam, the first optical configuration further comprising at least one spot displacement device, the first optical configuration adapted to receive each the individual light beam emerging from each the input light source, the first optical configuration further adapted to direct a give a light beam to a spatial light modulator; a second optical configuration, the second optical configuration comprising a second plurality of optical elements configured so as to define a plurality of possible light paths for each the individual light beam, the second optical configuration adapted to receive as input an individual light beam reflected from the spatial light modulator, the second optical configuration further adapted to direct a light beam to the spatial light modulator; and a the spatial light modulator, the spatial light modulator comprising at least one column, each the column comprising at least two rows, the spatial light modulator adapted to select a given path from the plurality of possible light paths for a given light beam, wherein the spot displacement device is operable for shifting a light beam on the spatial light modulator by at least one row disclosed in the claims is not found in the prior art.

Conclusion

4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tuyen Tra whose telephone number is (703) 306-5712. The examiner can normally be reached on Monday to Thursday from 8:30am to 6:00pm.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Georgia Epps, can be reached on (703) 308-4883. The fax number for this Group is (703) 308-7722.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (703) 308-0956.

tt

August 8, 2003


Hung Xuan Dang
Primary Examiner